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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/520,156

09/23/2005

Roger Suanez

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EXAMINER

SMITHERS, MATTHEW

ART UNIT

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**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b> 10/520,156	<b>Applicant(s)</b> SUANEZ ET AL.	
	<b>Examiner</b> Matthew B. Smithers	<b>Art Unit</b> 2437	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 04 January 2005.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-25 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-4 and 17-25 is/are rejected.
- 7) ☒ Claim(s) 5-16 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 04 January 2005 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All    b) ☐ Some \*    c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)            | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)   | Paper No(s)/Mail Date. _____                                      |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date <u>1/4/05</u> .  | 6) <input type="checkbox"/> Other: _____                          |

## **DETAILED ACTION**

### ***Information Disclosure Statement***

The information disclosure statement filed January 4, 2005 has been placed in the application file and the information referred to therein has been considered as to the merits.

### ***Claim Objections***

Claims 22-25 are objected to under 37 CFR 1.75(d), as the claim or claims must conform to the invention as set forth in the remainder of the specification and the terms and phrases used in the claims must find clear support or antecedent basis in the description so that the meaning of the terms in the claims may be ascertainable by reference to the description.

Claim 23 is objected to because of the following informalities: Claim 23 depends from claim 22 and recites a “software medium . . .”, however claim 22 recites a “data medium . . .” and not a “software medium . . .”. Appropriate correction is required.

### ***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

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(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1-4 and 17-25 are rejected under 35 U.S.C. 102(b) as being anticipated by US 6,163,842 granted to Barton.

Regarding claim 1, Barton meets the claimed limitations as follows:

“Process for ensuring the secure transmission of a message from a transmitter (1) to a receiver (2), in which the transmitter generates and integrates into the message a signature so as to produce a signed message, characterized by the fact that said process consists of the following stages: the transmitter associates with the signed message transmission checking information (IDEM) deriving from the signed message according to a specified law, and the transmitter generates and transmits (105) to the receiver data that represent the signed message and the transmission checking information (IDEM), and the receiver: receives said transmitted data, determines (204), according to said law, reception checking information (IDEM') deriving from the message received, and compares (205) reception checking information (IDEM') against the transmission checking information (IDEM) in order to validate the message received in the event that they coincide.” see column 6, line 55 to column 8, line 26; and Figures 1-3.

Regarding claim 2, Barton meets the claimed limitations as follows:

“Process according to claim 1, wherein said law implements a mathematical function.” see column 7, lines 33-46.

Regarding claim 3, Barton meets the claimed limitations as follows:

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“Process according to claim 1, wherein the transmitter additionally generates and transmits transmitter identification information (CRYPT\_IDENT or IDENT\_SPY) that was used to personalize said law, and the receiver likewise personalizes the law according to the transmitter identification information (CRYPT\_IDENT or IDENT\_SPY) that is received in order to determine the reception checking information.” see column 2, line 66 to column 3, line 32; column 9, line 64 to column 10, line 16 and Figures 1-3.

Regarding claim 4, Barton meets the claimed limitations as follows:

“Process according to claim 3, wherein the transmitter sets up said law such that the transmission checking information (IDEM) is representative of at least one kind of information that is selected from within the group composed of message consistency information (X') and message meaning information (Y').” see column 2, line 66 to column 3, line 32; column 4, lines 21-36; column 9, line 64 to column 10, line 16 and Figures 1-3.

Regarding claim 17, Barton meets the claimed limitations as follows:

“Process according to claim 1, wherein said data are transmitted to the receiver via a data storage system.” see column 3, lines 19-27.

Regarding claim 18, Barton meets the claimed limitations as follows:

“Process according to claim 17, wherein the receiver (2) is also the transmitter (1).” see column 3, lines 19-27.

Regarding claim 19, Barton meets the claimed limitations as follows:

“System for securing the implementation of the process of claim 1, comprising a transmitter (1) that is associated with a receiver (2), whereby the transmitter is designed

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to generate and integrate with the message a signature so as to produce a signed message, wherein: the transmitter (1) contains: means (103, 104) for generating and associating with the signed message transmission checking information (IDEM) deriving from the signed message according to a specified law, and means (105) for sending to the receiver (2) data that represent the signed message and the transmission checking information (IDEM), and the receiver (2) contains: means for receiving said transmitted data, means (203, 204) for determining, according to said law, reception checking information deriving from the message received, and means (205) for comparing the reception checking information against the transmission checking information (IDEM) in order to validate the received message in the event that they coincide.” see column 6, line 55 to column 8, line 26; and Figures 1-3.

Regarding claim 20, Barton meets the claimed limitations as follows:

“Security system according to claim 19, wherein the transmission means (105) are also controlled by means (103) for generating the transmitter identification information (CRYPT\_IDENT or IDENT\_SPY) that was used to personalize said law, and the receiver likewise contains means for personalizing the law, according to the transmitter identification information (CRYPT\_IDENT or IDENT\_SPY) that was received by the reception means, which control the means (204) for determining the reception checking information.” see column 2, line 66 to column 3, line 32; column 9, line 64 to column 10, line 16 and Figures 1-3.

Regarding claim 21, Barton meets the claimed limitations as follows:

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“Security system according to claim 19, wherein the transmitter is designed (104) such that said law ensures that the transmission checking information (IDEM) is representative of at least one kind of information that is selected from among the group that consists of the message consistency information and the message meaning information.” see column 2, line 66 to column 3, line 32; column 4, lines 21-36; column 9, line 64 to column 10, line 16 and Figures 1-3.

Regarding claim 22, Barton meets the claimed limitations as follows:

“Data medium that contains a set of software for controlling a computer system for the purpose of implementing the process of claim 1, whereby the set of software contains at least one of the following two subsets: a first subset for the transmitter that contains software for controlling the system for associating with the signed message the transmission checking information (IDEM) deriving from the signed message according to a specified law, and software for controlling the generation and transmission (105) to the receiver of the data that represent the signed message and the transmission checking information (IDEM), and a second subset for the receiver that contains software for receiving the above-mentioned transmitted data, software (204) for determining, according to said law, the reception checking information (IDEM') deriving from the received message, and software (205) for comparing the reception checking information (IDEM') against the transmission checking information (IDEM) in order to validate the received message in the event that they coincide.” see column 6, line 55 to column 8, line 26; and Figures 1-3.

Regarding claim 23, Barton meets the claimed limitations as follows:

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“Software medium according to claim 22, wherein the first subset additionally contains software for generating and transmitting the transmitter identification information (CRYPT\_IDENT or IDENT\_SPY) that was used to personalize said law, and the second subset likewise contains software for personalization according to this same law based on the transmitter identification information (CRYPT\_IDENT or IDENT\_SPY) that is received in order to determine the reception checking information.” see column 2, line 66 to column 3, line 32; column 9, line 64 to column 10, line 16 and Figures 1-3.

Regarding claim 24, Barton meets the claimed limitations as follows:

“Data medium according to claim 22, wherein said law is set up such that the transmission checking information (IDEM) is representative of at least one kind of information that is selected from the group that consists of the message consistency information (X') and the message meaning information (Y') .” see column 2, line 66 to column 3, line 32; column 4, lines 21-36; column 9, line 64 to column 10, line 16 and Figures 1-3.

Regarding claim 25, Barton meets the claimed limitations as follows:

“Data medium according to claim 22, consisting of a chip card.” see column 9, lines 41-48 and Figure 3.

### ***Allowable Subject Matter***

Claims 5-16 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.



The following is a statement of reasons for the indication of allowable subject matter:

With respect to claims 5-8, the cited prior art fails to specifically teach wherein the message consistency information (X) is determined by a first quotient that is provided by dividing the transmitter identification information (IDENT\_SPY) by a number of characters contained in the message.

With respect to claim 9, the cited prior art fails to specifically teach wherein the message consistency information (X') is represented by characters, the number of which is below a threshold that represents a specified percentage relative to a size of the transmitted data.

With respect to claim 10, the cited prior art fails to specifically teach wherein the message meaning information (Y') is determined by adding up a specified number of alphanumeric characters of the message, whereby each alphanumeric character has a value that is twice the ASCII value that is representative of the character in question, minus an ASCII value that is representative of an adjacent character, whereby the resulting sum is taken as a divisor of a dividend, which is the transmitter identification information (IDENT\_SPY), so as to provide the message meaning information.

With respect to claim 11, the cited prior art fails to specifically teach wherein the message meaning information (Y') is represented by characters, the number of which is below a threshold that represents a specified percentage relative to a size of the transmitted data.

With respect to claims 12-16, the cited prior art fails to specifically teach wherein the transmitter identification information (IDENT\_SPY) is obtained: by a stage for transcoding of strings, of specified sizes, of alphanumeric characters that represent data fields to be protected, thus providing a first set of intermediate results, each of which has a specified number of digits, and a stage for transforming the first set of intermediate results by means of a transformation algorithm (As) that is randomly selected from among a set of algorithms (s), each of which uses an alphanumeric-character base that is particular to the algorithm in question in order to obtain a final result (IDENT\_SPY) after a conversion matrix is used to convert the characters of the alphanumeric base of the selected algorithm into characters having numerical values of a predetermined base.

### ***Conclusion***

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

- A. Jain et al (US 7,213,150).
- B. Chen (US 6,058,187).
- C. Lipner et al (US 5,956,403).
- D. Naccache (US 5,910,989).
- E. Samar (US 5,778,072).
- F. M'Raihi et al (US 5,625,695).
- G. Naccache et al (US 5,414,772).

H. Naccache et al (US 5,347,581).

I. Angebaud et al (US 5,218,637).

J. Schnorr (US 4,995,082).

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Matthew B. Smithers whose telephone number is (571) 272-3876. The examiner can normally be reached on Monday-Friday (8:00-4:30) EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Emmanuel L. Moise can be reached on (571) 272-3865. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Matthew B Smithers/  
Primary Examiner, Art Unit 2437